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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/575,118	05/23/2000	Paul Lapstun	NPA012US	9159

7590 12/13/2004

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EXAMINER
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JORGENSEN, LELAND R

ART UNIT	PAPER NUMBER
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2675

DATE MAILED: 12/13/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

09/575,118

Applicant(s)

LAPSTUN ET AL.

Examiner

Leland R. Jorgensen

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 22 June 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 47 - 60 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 47 - 60 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All. b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 120104.
- ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Claim Rejections - 35 USC § 103***

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
2. Claims 47 – 50 and 54 - 57 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cass, USPN 5,692,073, in view of LaMarca et al., USPN 6,279,013 B1.

#### **Claims 47 and 54**

As to claim 47, Cass teaches printing 2200 a document [page 1100] containing a list of directory entries [active elements 1101 and 1102]. The directory entries correspond to at least one node of an index of the directory 420. At least one interactive element (see discussion of interactive element in response to argument below) enables a user to indicate a request for further directory information by interacting with the element using a sensing device which is adapted to transmit request data 2200 to a computer system [computer 100]. Cass teaches printing the further directory 2272 on a document 1110, 1120. Cass, col. 8, lines 30 – 35; col. 10, lines 13 – 17; col. 17, lines 4 – 26; figures 2, 4, 5, 21 and 22.

As to claim 54, Cass teaches a computer system [computer 100] for formatting a document [page 1100] with a list of directory entries [active elements 1101 and 1102] corresponding to at least one node of an index of the directory and at least one user interactive element to enable a user to request further directory information. Cass teaches a printer 104 for printing the document. Cass, col. 8, lines 30 – 35; col. 10, lines 13 – 17; col. 17, lines 4 – 26;

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figures 2, 3, 4, 5, 21 and 22. Cass teaches a sensing device for interacting with the element and transmitting request data to the computer system to facilitate the further information being sent from the computer system to the printer for printing in a further document. Cass, col. 6, lines 20 – 24.

Although Cass does not specifically teach in the preferred embodiment that the directory entries include coded data indicative of the at least one user inactive element, Cass cites prior art that teaches,

As another example, specially coded information, such as a pattern of data glyphs or a bar code, can be included in the form itself to indicate the layout of the blank fields in the form. The computer can be programmed in this case to seek the coded information at a predesignated location within the received image, and to use the coded information together with additional (stored or preprogrammed) information to identify what kind of form has been sent and to determine what is to be done in response to the boxes checked by the user.

Cass, col. 2, lines 61 – 67. See also, Cass, col. 11, lines 22 – 26. Moreover, Cass invites one in the art to incorporate such coded data.

Persons of skill in the art will appreciate that a number of different techniques can be used to retrieve the appropriate reference document from a collection of such documents given a marked document instance. Image-based techniques have great generality, and do not require the indexed documents to include any particular kind of content. Symbolic techniques can be used where and as appropriate.

Cass, col. 11, lines 27 – 33.

Cass, however, does not teach that the list of directory entries and the coded data is printed substantially simultaneously. Cass also describes the sensing device as a scanner and a computer sensing the entries on the scanned data. Therefore, Cass does not specifically teach that the sensing device is “...adapted to (a) sense at least some of the coded data when the user

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touches the sensing device against the surface in the vicinity of the selected user interactive element,...”

LaMarca teaches a list of directory entries [assorted content items 12, 14, 16] and the coded data [associated tokens 18, 20, 22, 24] that are printed substantially simultaneously.

LaMarca, col. 2, lines 9 – 16; col. 5, lines 4 – 12 and 34 – 40; and figures 1 and 2. LaMarca also teaches a printer 40 for printing a document 10 and 42. LaMarca, figures 1 and 2.

Moreover, LaMarca teaches receiving data from a sensing device. The indicating data is indicative of an identity of the document and an identity of the at least one user interactive element. LaMarca, col. 3, line 59 – col. 4, line 38; col. 5, lines 1 – 5; col. 6, lines 1 – 8; and figures 1 – 4. Like Cass, LaMarca teaches that the device may be a scanner and computer. LaMarca, however, also teaches that a sensing device such as a smart wand 70 that is adapted to (a) sense at least some of the coded data when the user touches the sensing device against the surface in the vicinity of selected user interactive element; and (b) generate the indicating data using at least some of the sensed coded data. LaMarca, col. 2, lines 52 – 63; col. 5, lines 16 – 26; col. 6, lines 24 – 52; and figure 5. LaMarca teaches identifying, using the indicative data, further directory information relating to the selected user interactive element and providing the further directory information to the user. LaMarca, col. 5, lines 4 – 12 and 34 – 40; and figures 1 and 2.

It would have been obvious to one of ordinary skill in the art at the time of the invention to combine simultaneous printing of the directory entries and coded data and the handheld sensing device as taught by LaMarca with the method and system for navigating a directory as taught by Cass to provide “an interactive media document which allows essentially a continuous

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updating of subject matter or form for a fine-grain profile of a reader/subscriber, particularly useful for print media documents.” LaMarca, col. 3, lines 55 – 58. Moreover, this advantage is not limited to a newspaper. LaMarca invites such combination with a system for navigating a directory by teaching,

To this point, the invention has been referred to as a newspaper and in terms of content being produced by a mass media publication. The invention has equal merit within an organization where the publication is more of a newsletter than a newspaper. In this context, the delivery would most likely be via mail boxes and the content would be more specific to that organization. As an example, a customized newsletter may contain content such as updates from information services, internal distribution lists, or menus from the cafeteria. In this context even more personalized data might be presented. An employee who had not turned in their W2 tax form might get a reminder at the end of the newsletter and this reminder would continue to appear in future issues until the form is submitted.

LaMarca, col. 5, lines 41 – 54. See also, LaMarca, col. 1, lines 4 – 19; col. 1, line 65 – col. 2, line 6; col. 2, line 64 – col. 3, line 17; and col. 5, lines 27 – 40.

#### **Claims 48 and 55**

Cass teaches a further directory information includes a list of directory entries corresponding to at least one node of an index. Cass, col. 8, lines 30 – 35; col. 10, lines 13 – 17; col. 17, lines 4 – 26; figures 2, 4, 5, 21 and 22.

#### **Claims 49 and 56**

Cass shows first, pervious, next, and last nodes in the sample directory, e.g. “Myna Bird,” “Toucans” 1111, and “Parrots” 1112. Cass, figure 21.

### **Claims 50 and 57**

Cass teaches that the further directory information includes a list of further nodes in the directory index. Cass, col. 8, lines 30 – 35; col. 10, lines 13 – 17; col. 17, lines 4 – 26; and figures 2, 4, 5, 21 and 22.

3. Claims 51 and 58 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cass in view of LaMarca et al. as applied to claim 1 or 16 above, and further in view of the Microsoft Computer Dictionary, 4<sup>th</sup> ed.

### **Claims 51 and 58**

Claims 51 and 58 each add that interacting with the at least one user interactive element corresponds to an operation of moving to one of a parent, child or root node of the index.

Although Cass shows a parent/child relationship about the information in figure 21, Cass does not specifically state that the user interactive element corresponds to an operation of moving to one of a parent, child or root node of the index.

The Microsoft Computer Dictionary teaches a parent/child relationship in a file directory. Microsoft Computer Dictionary, p. 332.

It would have been obvious to one of ordinary skill in the art at the time of the invention to use the parent/child relationship to organize the index because such organization is an common, effective, and efficient method to organize directory information.

4. Claims 34 – 46, 52, 53, 59, and 60 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cass in view of LaMarca et al. as applied to claim 1 or 16 above, or over Cass,

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LaMarca et al., and the Microsoft Computer Dictionary as applied to claim 51 or 58 above and further in view of Dymetman et al, USPN 6,330,976 B1.

### **Claims 34 and 41**

LaMarca teaches that the sensing device [smart wand 70] is hand-held. LaMarca, col. 5, lines 16 – 26; col. 6, lines 24 – 52; and figure 5.

Claim 34 describes a method of enabling a person to navigate a directory similar to the method described in claim 47 above. Claim 41 describes a system for enabling a person to navigate a directory similar to the system described in claim 54 above. Both add, however, that the indicating data is indicative of a position of the sensing device relative to the list of directory entries.

Neither Cass nor LaMarca, however, specifically teach that the indicating data is indicative of a position of the sensing device relative to the list of directory entries.

Dymetman that the indicating data is indicative of a position of the sensing device relative to the list of directory entries. Dymetman et al, col. 9, lines 16 – 22; col. 11, lines 28 – 43; and figures 1 and 2.

It would have been obvious to one of ordinary skill in the art at the time of the invention to combine receiving indicating data indicative of a position of the sensing device as taught by Dymetman with the method and system of enabling navigation of a directory as taught by Cass and LaMarca. Dymetman invites such combination by teaching,

The invention addresses problems in obtaining automatic actions through a network. It is often difficult to obtain an appropriate automatic action such as access to multimedia information or other information available through a network. This is especially true where the context includes a physical object such as a hardcopy document, and the action should be appropriate to the object.



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Dymetman, col. 2, lines 49 – 54. Dymetman adds,

The invention provides techniques that alleviate these problems. The techniques employ action/medium identifiers encoded in machine-readable markings on marking media such as sheets or stickers of paper or documents. Each action/medium identifier identifies an action. The action/medium identifier can be used to obtain an action identifier that can be provided through a network to an action device to produce the action. The action device provides the identified action automatically in response to the action identifier. The action/medium identifier also identifies the marking medium. Because the action/medium identifier identifies both the marking medium and the appropriate automatic action, the marking medium can be used to obtain the appropriate automatic action in a non-disruptive streamlined manner. The user can obtain the automatic action in a way that does not disturb normal reading activity and does not disturb document appearance.

Dymetman, col. 3, lines 22 - 38. Dymetman concludes,

The invention could be applied in various ways.

The invention could be applied in a synchronous mode to provide interactive books, magazines, maps, pocket encyclopedias, product catalogues, examination forms, paper address books, and so forth.

The invention could be applied in an asynchronous mode to allow collection of bookmarks while reading a document such as a newspaper or magazine, after which the bookmarks could be used in a batch to retrieve email clippings or print additional information.

Because the pointer behaves like a paper mouse, it can be used to record manual movements in real time, such as drawing or writing motions. Handwritten notes taken during a meeting or during making or playing of a recording can be captured and processed, handwritten faxes can be sent without using a computer, and freeform information requests can be written in an input rectangle inside an advertisement and transmitted to the sponsor for feedback.

Dymetman, col. 35, lines 2 – 19.

#### **Claims 35 – 38 and 42 – 45**

As to claims 35 - 38 and claims 42 – 45, see discussion of claims 48 – 51 and claims 55 – 58 above.

**Claims 39, 52, and 59**

Dymetman teaches receiving, in the computer system, movement data regarding movement of the sensing device relative to the document and identifying, in the computer system and from the movement data, further directory information relating to a selected node of the index of the directory. Dymetman, col. 11, lines 28 – 43; col. 35, lines 12 – 19; col. 37, lines 10 – 31 and 36 – 50.

**Claims 40, 53, and 60**

Dymetman teaches sensing its movement relative to the document using the coded data, generating the movement data and transmitting the movement data to the computer system. Dymetman, col. 11, lines 28 – 43; col. 35, lines 12 – 19; col. 37, lines 10 – 31 and 36 – 50.

**Claim 46**

Dymetman teaches that the computer system is adapted to receive movement data regarding movement of the sensing device relative to the document and interpret said movement of the sensing device as it relates to said at least one node of the index, the sensing device, when moved relative to the document, sensing the reference points using at least some of the coded data and generating the data regarding its own movement relative to the document. Dymetman, col. 11, lines 28 – 43; col. 35, lines 12 – 19; col. 37, lines 10 – 31 and 36 – 50.

***Response to Arguments***

5. Applicant's arguments filed 22 June 2004 have been fully considered but they are not persuasive. Applicants first noted that the term “active element” as used by Cass is not the same as the “interactive element” as used in the claims. The specification teaches describes the

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interactive element as text filed or button. See page 10, lines 9 – 12. The specification further describes the interactive element as follows.

Accordingly, a user may be provided with a netpages, which may more generally be referred to as a printed document with user interactive elements, formatted in accordance with their own preferences, with additional content targeted specifically to demographics of the user. The interactive element(s) relating to the targeted content allow the user to request further information relating to that content. The targeted content may relate to advertising material and the further information may be provided in the form of an advertising brochure. The manner in which the interactive element(s) are printed in the document and with which the sensing device is used to interact with the element(s), to indicate a request for further information, are as described above.

Page 43, lines 1 – 10. This is consistent with the description of active element found in Cass.

See Cass, col. 8, lines 36 – 53.

Applicant further argued that Cass differs from the claim “in that no coded data is printed onto the page, only plainly visible data is provided.” Remarks/Arguments, June 22, 2004, page 2. As stated in the discussion about claim 47 and 54 above, Cass suggests and LaMarca teaches such coded data. Moreover, none of the claims describe the coded data as invisible. Although the specification describes the preferred embodiment as having invisible coded data, (see e.g. page 5, lines 6 – 8, and page 10, lines 7 – 8), the claims do not include such limitation. As applicant notes, “Accordingly, it will be understood that the invention is not intended to be limited to the specific embodiments described in the present specification, including documents incorporated by cross-reference as appropriate. The scope of invention is only limited by the attached claims.” Specification, page 74, line 28 – page 75, line 1. Moreover, even if such limitation was found in any claim, Dymetman et al., cited above, teaches coded data that is invisible to the human eye. Dymetman, col. 11, lines 47 – 62. It would have been obvious to one of ordinary skill in the art at the time of the invention to combine the invisible coded data as

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taught by Dymetman with the system and method of navigating a directory as taught by Cass and LaMarca et al. to eliminate visual clutter on the printed page.

Applicants also argued that Cass does not teach that the method or system includes a hand-held sensing device that is adapted to (a) sense at least some of the coded data when the user touches the sensing device against the surface in the vicinity of selected user interactive element; and (b) generate the indicating data using at least some of the sensed coded data.

LaMarca, however, teaches a sensing device [smart wand 70] so adapted. See LaMarca, col. 5, lines 16 – 26; col. 6, lines 24 – 52; and figure 5.

Finally, applicants argued that one in the art would not find motivation to combine LaMarca with Cass because LaMarca is only limited to interactive newspapers. LaMarca, however, teaches,

The invention is particularly applicable to printed documents which include dataglyphs or tokens representative of the document and the subscriber to the document, wherein subscriber redactions to the document itself can be identified for modifying content and form of future editions. However, the subject invention is applicable to any system which provides routine generation of a document edition, either printed or electronically, and that presents an opportunity for the customized editing of a second edition by general profile guidelines for communicating information indicated by the subscriber as being particularly useful or of interest.

LaMarca, col. 1, lines 9 – 20.

### ***Conclusion***

**6. THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

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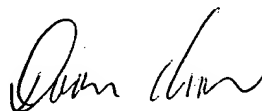
A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leland R. Jorgensen whose telephone number is 703-305-2650. The examiner can normally be reached on Monday through Friday, 7:00 a.m. through 3:30 p.m..

The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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DENNIS-DOON CHOW  
PRIMARY EXAMINER